



SEQUENCE LISTING

<110> LARSEN, BJARNE DUE

<120> PHARMACOLOGICALLY ACTIVE PEPTIDE CONJUGATES HAVING A
REDUCED TENDENCY TOWARDS ENZYMATIC HYDROLYSIS

<130> 55508 (45487)

<140> 09/341,590

<141> 1999-07-12

<150> DK 0317/98

<151> 1998-03-09

<160> 122

<170> PatentIn Ver. 2.1

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Tyr Xaa Gly Phe Cys
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Tyr Xaa Gly Phe Cys Arg Pro Ala
1 5

<210> 3

<211> 6

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Tyr Xaa Gly Phe Xaa Phe Ala
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Trp Ala Gly Gly Asp Ala Ser Gly Glu Lys Glu Lys Glu Lys Glu
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Tyr Gly Gly Phe Leu Glu Glu Glu Glu Glu
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Tyr Gly Gly Phe Leu
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Cys Tyr Ile Gln Asn Cys Pro Leu Gly
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Ala Leu Leu Glu Thr Tyr Cys Ala Thr Pro Ala Lys Ser Glu
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Gly Tyr Gly Ser Ser Ser Arg Arg Ala Pro Gln Thr
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Gln Thr

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<223> beta-Interleukin I (163-171)

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Val Gln Gly Glu Glu Ser Asn Asp Lys
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<213> Homo sapiens

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<223> beta-Interleukin II (44-56)

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Ile Leu Asn Gly Ile Asn Asn Tyr Lys Asn Pro Lys Leu
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<223> Interleukin II (60-70)

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Leu Thr Phe Lys Phe Tyr Met Pro Lys Lys Ala
1 5 10

<210> 25

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<213> Heloderma suspectum

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<223> exendin-4

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His Gly Glu Gly Thr Phe Thr Ser Asp Leu Ser Lys Gln Met Glu Glu
1 5 10 15

Glu Ala Val Arg Leu Phe Ile Glu Trp Leu Lys Asn Gly Gly Pro Ser
20 25 30

Ser Gly Ala Pro Pro Pro Ser
35

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<212> PRT

<213> Heloderma horridum

<220>

<223> exendin-3

<400> 26

His Ser Asp Gly Thr Phe Thr Ser Asp Leu Ser Lys Gln Met Glu Glu
1 5 10 15

Glu Ala Val Arg Leu Phe Ile Glu Trp Leu Lys Asn Gly Gly Pro Ser
20 25 30

Ser Gly Ala Pro Pro Pro Ser
35

<210> 27

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<223> Cys (Acm)

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Glu Glu Tyr Leu
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Glu Tyr Leu

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<211> 53

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<213> Homo sapiens

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<223> C-type natriuretic peptide (1-53)

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Asp Leu Arg Val Asp Thr Lys Ser Arg Ala Ala Trp Ala Arg Leu Leu
1 5 10 15

Gln Glu His Pro Asn Ala Arg Lys Tyr Lys Gly Ala Asn Lys Lys Gly
20 25 30

Leu Ser Lys Gly Cys Phe Gly Leu Lys Leu Asp Arg Ile Gly Ser Met
35 40 45

Ser Gly Leu Gly Cys
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 Met Cys His Xaa Gly Gly Arg Met Asp Arg Ile Ser Cys Tyr Arg
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 <210> 32
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 <223> Nle

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 Xaa Asp His Xaa Arg Trp Lys
 1 5

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 <223> Description of Artificial Sequence: thymosin alpha 1

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 Ser Asp Ala Ala Val Asp Thr Ser Ser Glu Ile Thr Thr Lys Asp Leu
 1 5 10 15

 Lys Glu Lys Lys Glu Val Val Glu Glu Ala Glu Asn
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<210> 34
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<223> Orn

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Cys Phe Ile Gln Asn Cys Pro Xaa Gly
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<223> D-Trp

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Xaa Cys Phe Xaa Lys Thr Cys Xaa
1 5

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<400> 36
Ala Cys Asp Thr Ala Thr Cys Val Thr His Arg Leu Ala Gly Leu Leu
1 5 10 15

Ser Arg Ser Gly Gly Val Val Lys Asn Asn Phe Val Pro Thr Asn Val
 20 25 30

Gly Ser Lys Ala Phe
 35

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<400> 37
 Tyr Pro Trp Phe
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 Tyr Pro Phe Phe
 1

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 Phe Gly Gly Phe Thr Gly Ala Arg Lys Ser Ala Arg Lys Leu Ala Asn
 1 5 10 15

Gln

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 <223> angiotensinogen (1-13)

<400> 40
Asp Arg Val Tyr Ile His Pro Phe His Leu Val Ile His
1 5 10

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<223> adrenomedullin (1-12)

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Tyr Arg Gln Ser Met Asn Asn Phe Gln Gly Leu Arg
1 5 10

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Gly Pro Xaa Gly Ala Gly
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Ile Leu Pro Trp Lys Trp Pro Trp Trp Pro Trp Arg Arg
1 5 10

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<223> osteocalcin (37-49)

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Gly Phe Gln Glu Ala Tyr Arg Arg Phe Tyr Gly Pro Val
1 5 10

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Xaa Glu Arg Pro Pro Leu Gln Gln Pro Pro His Arg Asp
1 5 10

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<223> cortistatin 14

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Pro Cys Lys Asn Phe Phe Trp Lys Thr Phe Ser Ser Cys Lys
1 5 10

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Xaa Leu Asp Ile Ile Trp
1 5

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Xaa Leu Asp Ile Ile Trp

1

5

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<211> 12

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inhibitor peptide

<400> 49

His His Leu Gly Gly Ala Lys Gln Ala Gly Asp Val

1

5

10

<210> 50

<211> 13

<212> PRT

<213> Homo sapiens

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<223> leptin (93-105)

<400> 50

Asn Val Ile Gln Ile Ser Asn Asp Leu Glu Asn Leu Arg

1

5

10

<210> 51

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<223> Description of Artificial Sequence: GR 83074

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<223> Nle

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1 5

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<400> 52
Tyr Pro Trp Gly
1

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<400> 53
Thr Arg Ser Ala Trp
1 5

<210> 54
<211> 14
<212> PRT
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Asp Arg Val Tyr Ile His Pro Phe His Leu Val Ile His Asn
1 5 10

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Lys Lys Lys Lys
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<220>
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Lys Lys Lys Lys Lys
  1             5

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Xaa Lys Lys Lys Lys
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<210> 58
<211> 5
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Glu, Arg, His, Met, Orn, Dbu or Dpr

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Lys Xaa Lys Lys Lys

1 5

<210> 59

<211> 5

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<400> 59

Lys Lys Xaa Lys Lys

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Glu, Arg, His, Met, Orn, Dbu or Dpr

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Lys Lys Lys Xaa Lys

1 5

<210> 61

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<400> 61

Lys Lys Lys Lys Xaa
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<210> 62

<211> 6

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Lys Lys Lys Lys Lys Lys
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Xaa Lys Lys Lys Lys Lys
1 5

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Lys Xaa Lys Lys Lys Lys
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 Lys Lys Lys Xaa Lys Lys
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 <210> 67
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 Lys Lys Lys Lys Xaa Lys
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<210> 68
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 <400> 68
 Lys Lys Lys Lys Lys Xaa
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 <400> 69
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Glu, Arg, His, Met, Orn, Dbu or Dpr

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1 5

<210> 71

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Glu, Arg, His, Met, Orn, Dbu or Dpr

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Glu, Arg, His, Met, Orn, Dbu or Dpr

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Xaa Lys Lys Xaa Lys Lys
1 5

<210> 72

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Glu, Arg, His, Met, Orn, Dbu or Dpr

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Glu, Arg, His, Met, Orn, Dbu or Dpr

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Xaa Lys Lys Lys Xaa Lys
1 5

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Xaa Lys Lys Lys Lys Xaa
1 5

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Glu, Arg, His, Met, Orn, Dbu or Dpr

<400> 74
Lys Xaa Xaa Lys Lys Lys
1 5

<210> 75
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 <221> MOD_RES
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 <223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
 Glu, Arg, His, Met, Orn, Dbu or Dpr

<400> 75
 Lys Xaa Lys Xaa Lys Lys
 1 5

<210> 76
 <211> 6
 <212> PRT
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Stabilizing peptide

<220>
 <221> MOD_RES
 <222> (2)
 <223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
 Glu, Arg, His, Met, Orn, Dbu or Dpr

<220>
 <221> MOD_RES
 <222> (5)
 <223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
 Glu, Arg, His, Met, Orn, Dbu or Dpr

<400> 76
 Lys Xaa Lys Lys Xaa Lys
 1 5

<210> 77
 <211> 6
 <212> PRT
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Stabilizing peptide

<220>
 <221> MOD_RES
 <222> (2)
 <223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
 Glu, Arg, His, Met, Orn, Dbu or Dpr

<220>
 <221> MOD_RES
 <222> (6)
 <223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
 Glu, Arg, His, Met, Orn, Dbu or Dpr

<400> 77
Lys Xaa Lys Lys Lys Xaa
1 5

<210> 78
<211> 6
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Stabilizing peptide

<220>
<221> MOD_RES
<222> (3)..(4)
<223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
Glu, Arg, His, Met, Orn, Dbu or Dpr

<400> 78
Lys Lys Xaa Xaa Lys Lys
1 5

<210> 79
<211> 6
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Stabilizing peptide

<220>
<221> MOD_RES
<222> (3)
<223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
Glu, Arg, His, Met, Orn, Dbu or Dpr

<220>
<221> MOD_RES
<222> (5)
<223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
Glu, Arg, His, Met, Orn, Dbu or Dpr

<400> 79
Lys Lys Xaa Lys Xaa Lys
1 5

<210> 80
<211> 6
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Stabilizing peptide

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<220>
<221> MOD_RES
<222> (3)
<223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
      Glu, Arg, His, Met, Orn, Dbu or Dpr

<220>
<221> MOD_RES
<222> (6)
<223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
      Glu, Arg, His, Met, Orn, Dbu or Dpr

<400> 80
Lys Lys Xaa Lys Lys Xaa
  1             5

<210> 81
<211> 6
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Stabilizing peptide

<220>
<221> MOD_RES
<222> (4)..(5)
<223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
      Glu, Arg, His, Met, Orn, Dbu or Dpr

<400> 81
Lys Lys Lys Xaa Xaa Lys
  1             5

<210> 82
<211> 6
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Stabilizing peptide

<220>
<221> MOD_RES
<222> (4)
<223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
      Glu, Arg, His, Met, Orn, Dbu or Dpr

<220>
<221> MOD_RES
<222> (6)
<223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
      Glu, Arg, His, Met, Orn, Dbu or Dpr

<400> 82

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Lys Lys Lys Xaa Lys Xaa
1 5

<210> 83
<211> 6
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Stabilizing peptide

<220>
<221> MOD_RES
<222> (5)..(6)
<223> May be Ala, Leu, Ser, Thr, Tyr, Asn, Gln, Asp,
Glu, Arg, His, Met, Orn, Dbu or Dpr

<400> 83
Lys Lys Lys Lys Xaa Xaa
1 5

<210> 84
<211> 6
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Stabilizing peptide

<400> 84
Lys Glu Lys Glu Lys Glu
1 5

<210> 85
<211> 6
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Stabilizing peptide

<400> 85
Glu Lys Glu Lys Glu Lys
1 5

<210> 86
<211> 6
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Stabilizing peptide

<400> 86

Lys Lys Lys Glu Glu Glu
1 5

<210> 87

<211> 6

<212> PRT

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence: Stabilizing peptide

<400> 87

Glu Glu Glu Lys Lys Lys
1 5

<210> 88

<211> 50

<212> PRT

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence: GHRH (1-44)-Lys6

<400> 88

Tyr Ala Asp Ala Ile Phe Thr Asn Ser Tyr Arg Lys Val Leu Gly Gln
1 5 10 15

Leu Ser Ala Arg Lys Leu Leu Gln Asp Ile Met Ser Arg Gln Gln Gly
20 25 30

Glu Ser Asn Gln Glu Arg Gly Ala Arg Ala Arg Leu Lys Lys Lys Lys
35 40 45

Lys Lys
50

<210> 89

<211> 50

<212> PRT

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence: GHRH (1-44)-Glu6

<400> 89

Tyr Ala Asp Ala Ile Phe Thr Asn Ser Tyr Arg Lys Val Leu Gly Gln
1 5 10 15

Leu Ser Ala Arg Lys Leu Leu Gln Asp Ile Met Ser Arg Gln Gln Gly
20 25 30

Glu Ser Asn Gln Glu Arg Gly Ala Arg Ala Arg Leu Glu Glu Glu Glu
35 40 45

Glu Glu
50

<210> 90
<211> 40
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Lys6-PTH (1-34)

<400> 90
Lys Lys Lys Lys Lys Lys Ser Val Ser Glu Ile Gln Leu Met His Asn
1 5 10 15
Leu Gly Lys His Leu Asn Ser Met Glu Arg Val Glu Trp Leu Arg Lys
20 25 30
Lys Leu Gln Asp Val His Asn Phe
35 40

<210> 91
<211> 40
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: PTH (1-34)-Lys6

<400> 91
Ser Val Ser Glu Ile Gln Leu Met His Asn Leu Gly Lys His Leu Asn
1 5 10 15
Ser Met Glu Arg Val Glu Trp Leu Arg Lys Lys Leu Gln Asp Val His
20 25 30
Asn Phe Lys Lys Lys Lys Lys Lys
35 40

<210> 92
<211> 36
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: GLP-1 (7-36)-Lys6

<400> 92
His Ala Glu Gly Thr Phe Thr Ser Asp Val Ser Ser Tyr Leu Glu Gly
1 5 10 15
Gln Ala Ala Lys Glu Phe Ile Ala Trp Leu Val Lys Gly Arg Lys Lys
20 25 30

Lys Lys Lys Lys
35

<210> 93
<211> 26
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: EMP-1-Lys6

<220>
<221> MOD_RES
<222> (6)
<223> Cys (Acm)

<220>
<221> MOD_RES
<222> (15)
<223> Cys (Acm)

<400> 93
Gly Gly Thr Tyr Ser Xaa His Phe Gly Pro Leu Thr Trp Val Xaa Lys
1 5 10 15

Pro Gln Gly Gly Lys Lys Lys Lys Lys Lys
20 25

<210> 94
<211> 26
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Lys6-EMP-1

<220>
<221> MOD_RES
<222> (12)
<223> Cys (Acm)

<220>
<221> MOD_RES
<222> (21)
<223> Cys (Acm)

<400> 94
Lys Lys Lys Lys Lys Lys Gly Gly Thr Tyr Ser Xaa His Phe Gly Pro
1 5 10 15

Leu Thr Trp Val Xaa Lys Pro Gln Gly Gly
20 25

<210> 95
<211> 32
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Lys6-EMP-1-Lys6

<220>
<221> MOD_RES
<222> (12)
<223> Cys (Acm)

<220>
<221> MOD_RES
<222> (21)
<223> Cys (Acm)

<400> 95
Lys Lys Lys Lys Lys Lys Gly Gly Thr Tyr Ser Xaa His Phe Gly Pro
1 5 10 15
Leu Thr Trp Val Xaa Lys Pro Gln Gly Gly Lys Lys Lys Lys Lys Lys
20 25 30

<210> 96
<211> 11
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: GHRP-(Lys)6

<220>
<221> MOD_RES
<222> (1)
<223> Aib

<220>
<221> MOD_RES
<222> (3)
<223> 2-D-Nal

<220>
<221> MOD_RES
<222> (4)
<223> D-Phe

<400> 96
Xaa His Xaa Xaa Lys Lys Lys Lys Lys Lys Lys
1 5 10

<210> 97
<211> 11
<212> PRT

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence:
Leu-enkephalin-Lys-Lys-Glu-Glu-Glu-Lys

<400> 97

Tyr Gly Gly Phe Leu Lys Lys Glu Glu Glu Lys
1 5 10

<210> 98

<211> 11

<212> PRT

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence:
Leu-enkephalin-Lys-Glu-Glu-Glu-Glu-Lys

<400> 98

Tyr Gly Gly Phe Leu Lys Glu Glu Glu Glu Lys
1 5 10

<210> 99

<211> 11

<212> PRT

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence: Leu-enkephalin (Lys-Glu)3

<400> 99

Tyr Gly Gly Phe Leu Lys Glu Lys Glu Lys Glu
1 5 10

<210> 100

<211> 11

<212> PRT

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence: Leu-enkephalin-(Dpr)6

<220>

<221> MOD_RES

<222> (6)..(11)

<223> Dpr

<400> 100

Tyr Gly Gly Phe Leu Xaa Xaa Xaa Xaa Xaa Xaa
1 5 10

<210> 101

<211> 11
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Lys6-Leu-enkephalin

<400> 101
Lys Lys Lys Lys Lys Lys Tyr Gly Gly Phe Leu
1 5 10

<210> 102
<211> 17
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence:
Lys6-Leu-enkephalin-Lys6

<400> 102
Lys Lys Lys Lys Lys Lys Tyr Gly Gly Phe Leu Lys Lys Lys Lys Lys
1 5 10 15

Lys

<210> 103
<211> 16
<212> PRT
<213> Homo sapiens

<220>
<223> GnRH-Lys6

<400> 103
Glu His Trp Ser Tyr Gly Leu Arg Pro Gly Lys Lys Lys Lys Lys Lys
1 5 10 15

<210> 104
<211> 16
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: GnRH-(Lys-Glu)3

<400> 104
Glu His Trp Ser Tyr Gly Leu Arg Pro Gly Lys Glu Lys Glu Lys Glu
1 5 10 15

<210> 105
<211> 40

<212> PRT
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: PTH 1-34 (Lys-Glu)3

<400> 105
 Ser Val Ser Glu Ile Gln Leu Met His Asn Leu Gly Lys His Leu Asn
 1 5 10 15
 Ser Met Glu Arg Val Glu Trp Leu Arg Lys Lys Leu Gln Asp Val His
 20 25 30
 Asn Phe Lys Glu Lys Glu Lys Glu
 35 40

<210> 106
 <211> 11
 <212> PRT
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Leu-enkephalin-(Orn)6

<220>
 <221> MOD_RES
 <222> (6)..(11)
 <223> Orn

<400> 106
 Tyr Gly Gly Phe Leu Xaa Xaa Xaa Xaa Xaa Xaa
 1 5 10

<210> 107
 <211> 11
 <212> PRT
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Leu-enkephalin-(Dbu)6

<220>
 <221> MOD_RES
 <222> (6)..(11)
 <223> Dbu

<400> 107
 Tyr Gly Gly Phe Leu Xaa Xaa Xaa Xaa Xaa Xaa
 1 5 10

<210> 108
 <211> 11
 <212> PRT
 <213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Leu-enkephalin-(Dpr)6

<220>
<221> MOD_RES
<222> (6)..(11)
<223> Dpr

<400> 108
Tyr Gly Gly Phe Leu Xaa Xaa Xaa Xaa Xaa Xaa
1 5 10

<210> 109
<211> 15
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Leu-enkephalin-Lys10

<400> 109
Tyr Gly Gly Phe Leu Lys Lys Lys Lys Lys Lys Lys Lys Lys Lys
1 5 10 15

<210> 110
<211> 9
<212> PRT
<213> Homo sapiens

<220>
<223> DSIP

<400> 110
Trp Ala Gly Gly Asp Ala Ser Gly Glu
1 5

<210> 111
<211> 17
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Substance P-Lys6

<400> 111
Arg Pro Lys Pro Gln Gln Phe Phe Gly Leu Met Lys Lys Lys Lys Lys
1 5 10 15

Lys

<210> 112
<211> 11

<212> PRT
<213> Homo sapiens

<220>
<223> Substance P

<400> 112
Arg Pro Lys Pro Gln Gln Phe Phe Gly Leu Met
1 5 10

<210> 113
<211> 17
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Lys6-Substance P

<400> 113
Lys Lys Lys Lys Lys Lys Arg Pro Lys Pro Gln Gln Phe Phe Gly Leu
1 5 10 15

Met

<210> 114
<211> 11
<212> PRT
<213> Artificial Sequence

<220>
<223> Description of Artificial Sequence: Lys6-GHRP

<220>
<221> MOD_RES
<222> (7)
<223> Aib

<220>
<221> MOD_RES
<222> (9)
<223> 2-D-Nal

<220>
<221> MOD_RES
<222> (10)
<223> D-Phe

<400> 114
Lys Lys Lys Lys Lys Lys Xaa His Xaa Xaa Lys
1 5 10

<210> 115
<211> 10
<212> PRT

<213> Homo sapiens

<220>

<223> GnRH

<220>

<221> MOD_RES

<222> (1)

<223> pGlu

<400> 115

Xaa His Trp Ser Tyr Gly Leu Arg Pro Gly
1 5 10

<210> 116

<211> 16

<212> PRT

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence: Lys6-GnRH

<400> 116

Lys Lys Lys Lys Lys Gln His Trp Ser Tyr Gly Leu Arg Pro Gly
1 5 10 15

<210> 117

<211> 20

<212> PRT

<213> Artificial Sequence

<220>

<223> Description of Artificial Sequence: EMP-1

<400> 117

Gly Gly Thr Tyr Ser Cys His Phe Gly Pro Leu Thr Trp Val Cys Lys
1 5 10 15

Pro Gln Gly Gly
20

<210> 118

<211> 30

<212> PRT

<213> Homo sapiens

<220>

<223> GLP-1-(7-36)

<400> 118

His Ala Glu Gly Thr Phe Thr Ser Asp Val Ser Ser Tyr Leu Glu Gly
1 5 10 15

Gln Ala Ala Lys Glu Phe Ile Ala Trp Leu Val Lys Gly Arg

20 25 30

<210> 119
 <211> 34
 <212> PRT
 <213> Homo sapiens

<220>
 <223> PTH (1-34)

<400> 119
 Ser Val Ser Glu Ile Gln Leu Met His Asn Leu Gly Lys His Leu Asn
 1 5 10 15
 Ser Met Glu Arg Val Glu Trp Leu Arg Lys Lys Leu Gln Asp Val His
 20 25 30
 Asn Phe

<210> 120
 <211> 11
 <212> PRT
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence:
 Leu-enkephalin-Lys- (Glu) 3- (Lys) 2

<400> 120
 Tyr Gly Gly Phe Leu Lys Glu Glu Glu Lys Lys
 1 5 10

<210> 121
 <211> 11
 <212> PRT
 <213> Homo sapiens

<220>
 <223> Leu-enkephalin- (Glu2-Lys-Glu3)

<400> 121
 Tyr Gly Gly Phe Leu Glu Glu Lys Glu Glu Glu
 1 5 10

<210> 122
 <211> 19
 <212> PRT
 <213> Artificial Sequence

<220>
 <223> Description of Artificial Sequence: Synthetic
 peptide

<400> 122

Ser Tyr Ser Met Glu His Phe Arg Trp Gly Lys Pro Val Lys Lys Lys
1 5 10 15

Lys Lys Lys